AMENDMENTS TO THE CLAIMS:

This listing of claims will replace all prior versions, and listings, of claims in the above-captioned patent application:

Listing of Claims:

1. (Amended) An optical fiber formed by a method which comprises:

(a) providing a preform having a glass core, a substantially homogeneous coating of a light interactive material over said glass core and a glass cladding over said coating of said light interactive material, with said glasses having an overlapping flow range and said coating material having a flow point which lies below the flow range of said glasses with said flow range being in the range of about 600-1500°C; and

(b) heating said preform to an elevated temperature and drawing a fiber from said preform at the flow temperature of said glasses, whereby [[a]] said fiber ~~is formed having~~ has a substantially continuous film of said light interactive material formed between said core and cladding throughout the entire length of ~~the~~ said fiber, whereby said coating material strongly interacts with light in the core to effect ~~either high dispersion, absorption saturation,~~ amplification~~, Faraday rotation or other similar effects of the said light~~.

2. (Amended) An optical fiber formed by a method which comprises:

(a) providing a preform having a glass core, a substantially homogeneous coating of a light interactive material over said glass core and a glass cladding over said coating of said light interactive material, where said light interactive material is an inorganic material selected from the group consisting of a metal, metal alloy, ferrite, ceramic, magnetic material and a semiconductor, with said glasses having an overlapping flow range and said coating material having a flow point which lies below the flow range of said glasses with said flow range being in the range of about 600-1500°C; and

(b) heating said preform to an elevated temperature and drawing a fiber from said preform at the flow temperature of said glasses, whereby [[a]] said fiber ~~is formed having~~ has a substantially continuous film of said light interactive material formed between said core and cladding throughout the entire length of ~~the~~ said fiber, whereby said coating material strongly interacts with light in the core to effect ~~either high dispersion, absorption saturation,~~ amplification~~, Faraday rotation or other similar effects of the said light~~.